



This is a digital copy of a book that was preserved for generations on library shelves before it was carefully scanned by Google as part of a project to make the world's books discoverable online.

It has survived long enough for the copyright to expire and the book to enter the public domain. A public domain book is one that was never subject to copyright or whose legal copyright term has expired. Whether a book is in the public domain may vary country to country. Public domain books are our gateways to the past, representing a wealth of history, culture and knowledge that's often difficult to discover.

Marks, notations and other marginalia present in the original volume will appear in this file - a reminder of this book's long journey from the publisher to a library and finally to you.

Usage guidelines

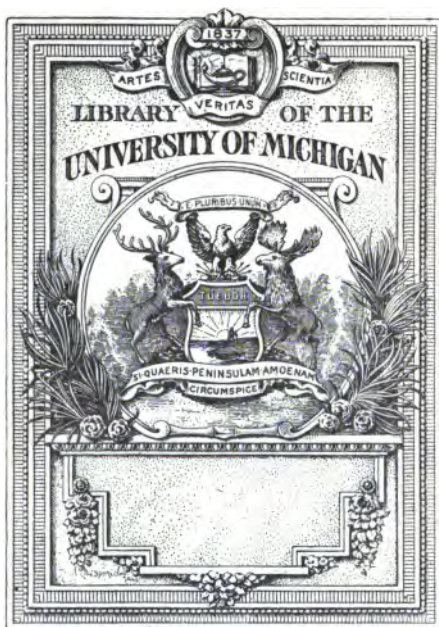
Google is proud to partner with libraries to digitize public domain materials and make them widely accessible. Public domain books belong to the public and we are merely their custodians. Nevertheless, this work is expensive, so in order to keep providing this resource, we have taken steps to prevent abuse by commercial parties, including placing technical restrictions on automated querying.

We also ask that you:

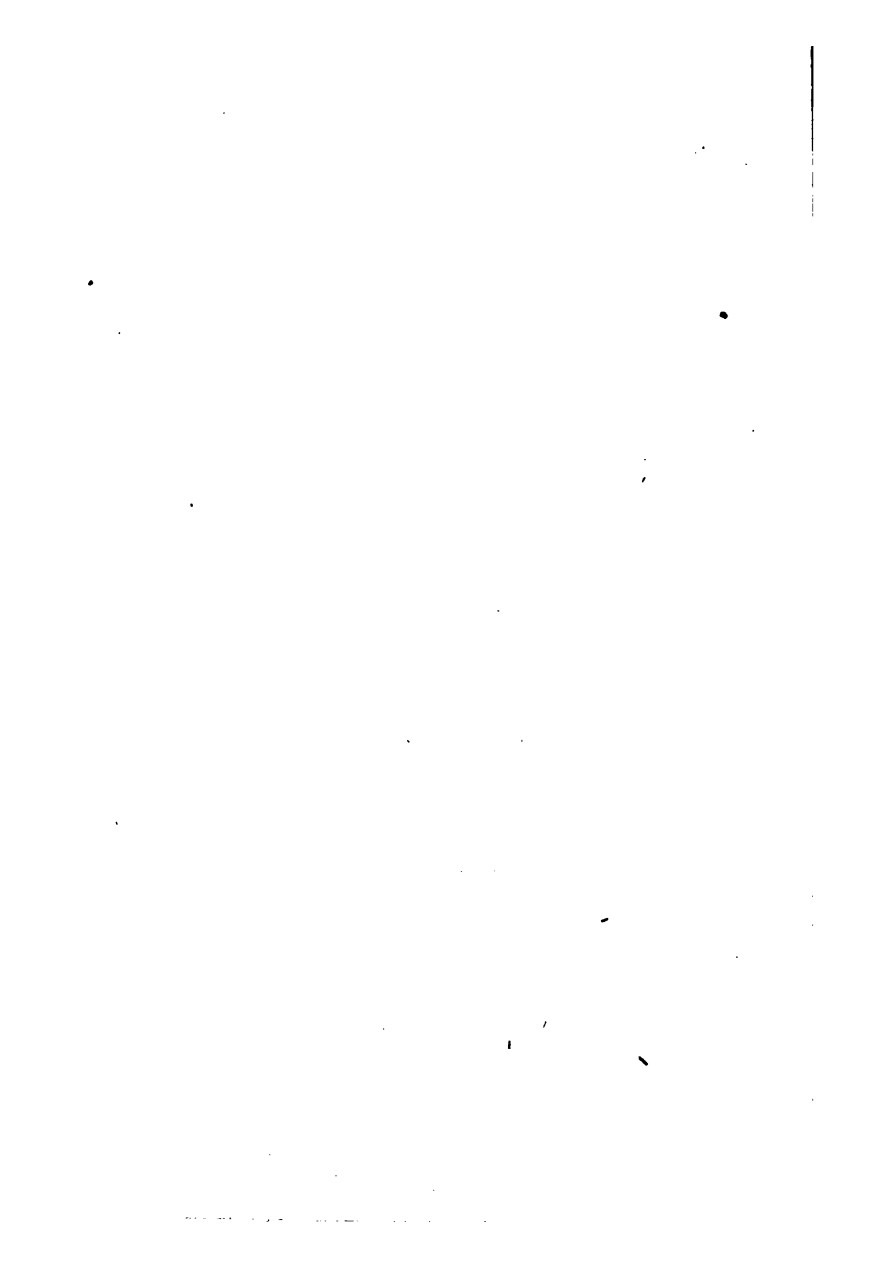
- + *Make non-commercial use of the files* We designed Google Book Search for use by individuals, and we request that you use these files for personal, non-commercial purposes.
- + *Refrain from automated querying* Do not send automated queries of any sort to Google's system: If you are conducting research on machine translation, optical character recognition or other areas where access to a large amount of text is helpful, please contact us. We encourage the use of public domain materials for these purposes and may be able to help.
- + *Maintain attribution* The Google "watermark" you see on each file is essential for informing people about this project and helping them find additional materials through Google Book Search. Please do not remove it.
- + *Keep it legal* Whatever your use, remember that you are responsible for ensuring that what you are doing is legal. Do not assume that just because we believe a book is in the public domain for users in the United States, that the work is also in the public domain for users in other countries. Whether a book is still in copyright varies from country to country, and we can't offer guidance on whether any specific use of any specific book is allowed. Please do not assume that a book's appearance in Google Book Search means it can be used in any manner anywhere in the world. Copyright infringement liability can be quite severe.

About Google Book Search

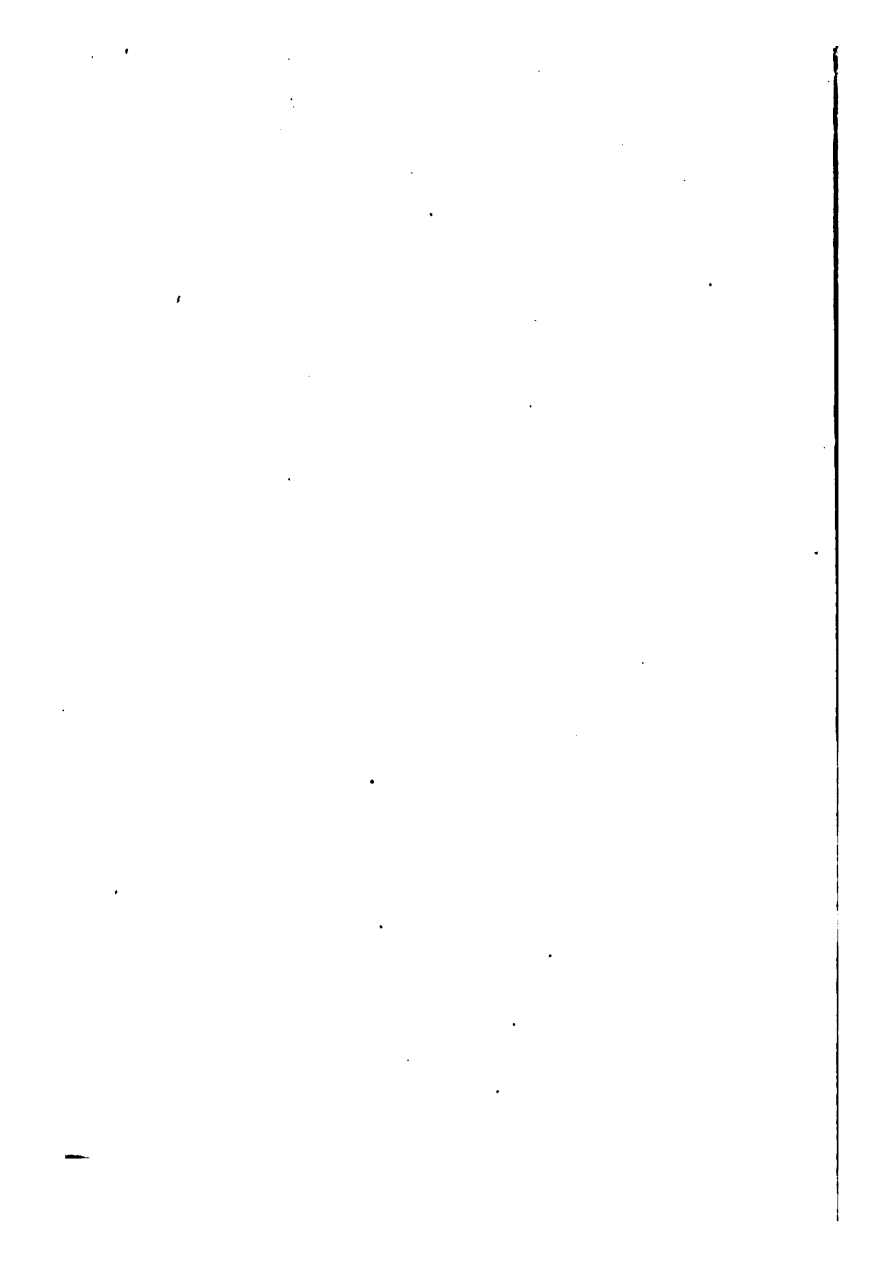
Google's mission is to organize the world's information and to make it universally accessible and useful. Google Book Search helps readers discover the world's books while helping authors and publishers reach new audiences. You can search through the full text of this book on the web at <http://books.google.com/>



SB
405
.T12



**MAKING A GARDEN
TO BLOOM THIS YEAR**





There are three classes of flowering plants from which the garden may be stocked to bloom this year. One of these classes—annuals—has sufficed to produce the garden pictured here. From seed sown indoors in flats or outdoors in May, a continuous bloom throughout the summer may be secured

100

**THE
HOUSE & GARDEN
MAKING
BOOKS**

IT is the intention of the publishers to make this series of little volumes, of which *Making a Garden to Bloom This Year* is one, a complete library of authoritative and well illustrated hand-books dealing with the activities of the home-maker and amateur gardener. Text, pictures and diagrams will, in each respective book, aim to make perfectly clear the possibility of having, and the means of having, some of the more important features of a modern country or suburban home. Among the titles already issued or planned for early publication are the following: *Making a Rose Garden; Making a Lawn; Making a Tennis Court; Making a Fireplace; Making Paths and Driveways; Making a Poultry House; Making a Garden with Hotbed and Coldframe; Making Built-in Bookcases, Shelves and Seats; Making a Rock Garden; Making a Water Garden; Making a Perennial Border; Making the Grounds Attractive with Shrubbery; Making a Naturalized Bulb Garden;* with others to be announced later.

Making a Garden To Bloom This Year

By GRACE TABOR



NEW YORK
McBRIDE, NAST & COMPANY
1912

**COPYRIGHT, 1912, BY
McBRIDE, NAST & CO.**

Published April, 1912

CONTENTS

PART ONE—GENERAL

	PAGE
THE KIND OF GARDEN	1
COLOR AND ITS COMBINATIONS	8
CULTURE	14

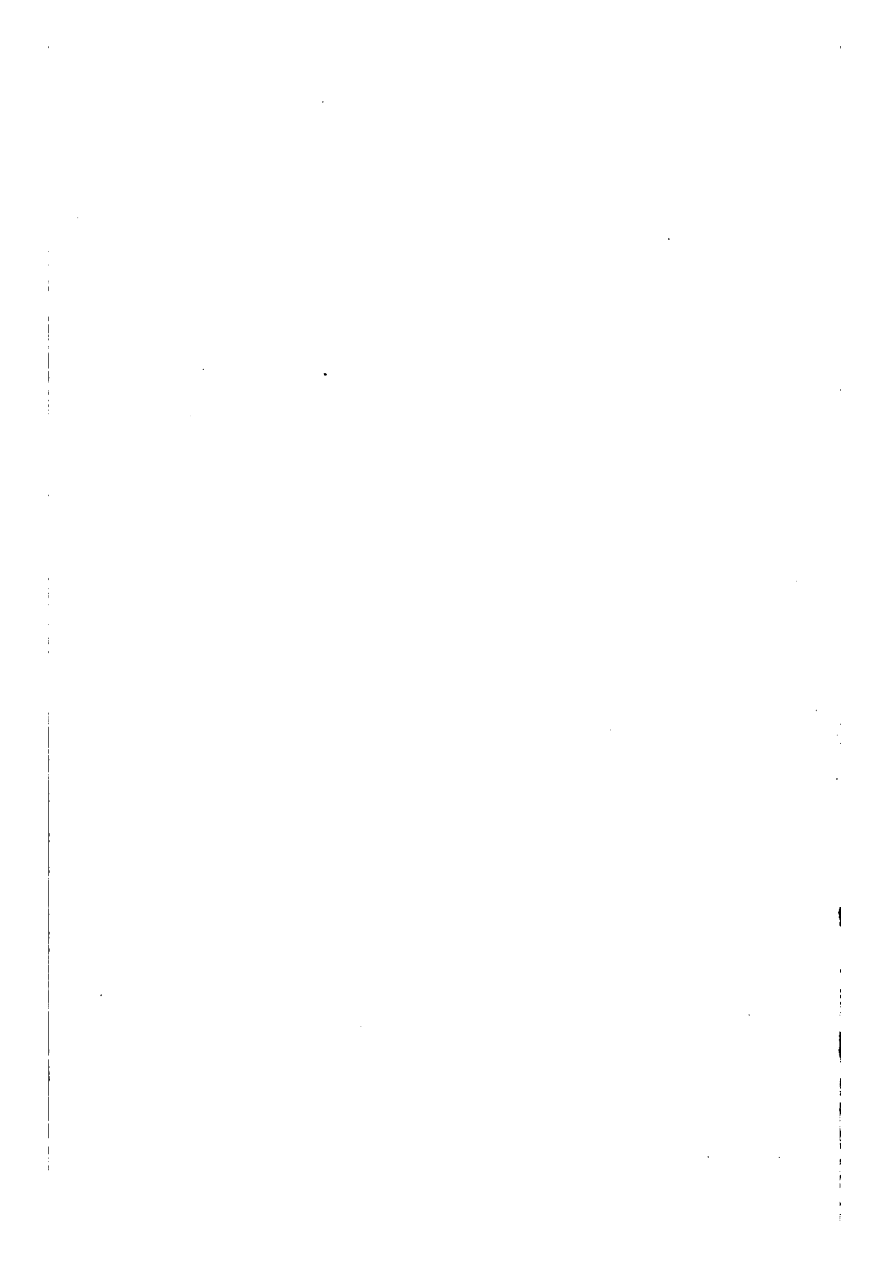
PART TWO—THE KINDS OF PLANTS

ANNUALS	22
COMPARATIVE LIST OF ANNUALS	33
PERENNIALS	42
COMPARATIVE LIST OF PERENNIALS	46
SUMMER-FLOWERING BULBS AND ROOTS	51
LIST OF SUMMER-FLOWERING BULBS AND ROOTS	53

245383

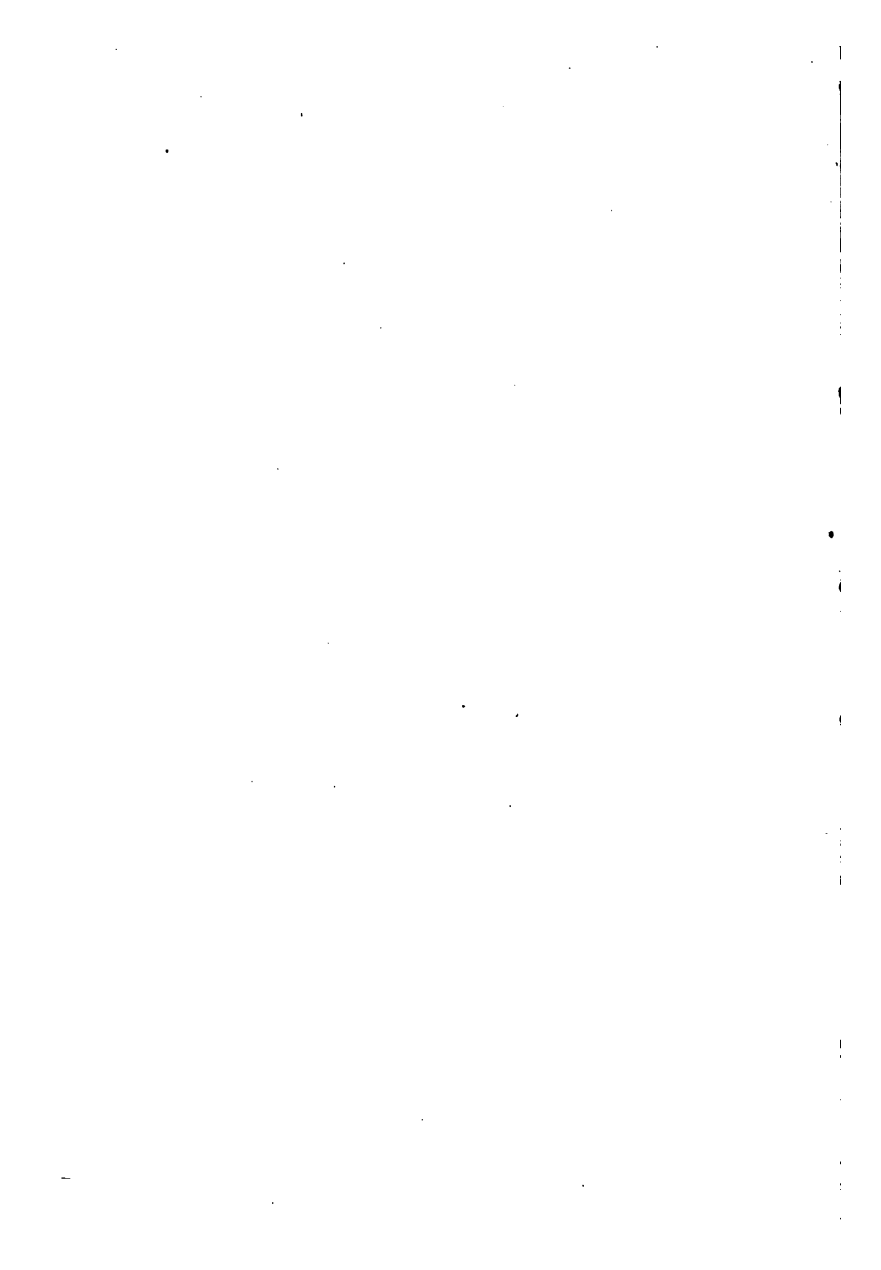
O227127.8

Recd. 11-14-37



THE ILLUSTRATIONS

A GARDEN OF ANNUALS	<i>Frontispiece</i>
	FACING PAGE
IMMEDIATE BLOOM SECURED BY SET- TING OUT PLANTS	4
THE OLD-TIME "MOURNING BRIDE" OR SCABIOSA	12
THE SIMPLE APPARATUS FOR RAISING PLANTS INDOORS	16
THE FLAT FOR STARTING PLANTS INDOORS	20
SUMMER CYPRESS, A SYMMETRICAL FOLIAGE PLANT	30
SCHIZANTHUS, THE BUTTERFLY FLOWER	36
GLADIOLI IN THE BORDER	52



Making a Garden to Bloom This Year

PART ONE—GENERAL

THE KIND OF GARDEN

IT is hardly news to any reader, I am sure, to be told that there are three great classes of plants—of flowering plants, let us say—from which a garden may be stocked; that these are perennials, biennials, and annuals; and that perennials, once established, either from seed or root, persist and bloom year after year; biennials start from seed one year, do not blossom until the next—usually—and, having fulfilled a life round, die at the end of the second year; and annuals come from the seed, mature, blossom, produce seed, and die, all in one year, or, more accurately speaking, in one summer. But we will remind ourselves of this because we

2 *Making a Garden to Bloom This Year*

must consider the three kinds separately, or, at least, under two quite distinct headings.

Obviously annuals offer the most promising material for short-time gardening, although there are many plants of the other classes which mature rapidly enough to make them available, even starting them from seed, while practically any of them may be used if young plants are purchased in the spring instead of seed planted. A first-year garden may thus cost little or much, according as it is made entirely from seed or entirely from growing plants purchased in the nursery, or from a florist who deals in such permanent things. And even the annuals may be bought, ready growing, if time presses, or if one is averse to the trouble of raising them in the house, or suspects his own ability. But if plants are purchased, be sure that only such as are perfectly fresh and freshly lifted from the frames are accepted. These only will succeed, for annuals have only one summer to do everything in, and a day with them is equivalent to a much longer period in the life of their sturdier perennial relatives. They cannot endure prolonged

hardship and privation and ever amount to anything afterward.

The design to be employed for a garden planned for only one season is not so vital as the design which permanent planting demands; nevertheless, it should be as good as it can be, under the limitations which the character of the soil may impose, or which are imposed by unalterable conditions. I speak of the soil conditions separately, for ordinary soil is alterable, up to a certain point, even within the limits of a single summer; but there are conditions which may not be changed within so short a space of time—conditions of shade sometimes, or moisture, or dryness—and there are some imposed by absolutely unalterable physical peculiarities. The garden design, as well as the selection of the plants, must, therefore, conform to these, for even annuals have their preferences, which are worth considering and conceding.

There are two reasons for wanting a garden "this year." One is the very natural wish not to have even a single barren summer around even the newest dooryard; the other is what we may call

4 *Making a Garden to Bloom This Year*

"temporary residence." Both of these are, of course, equally urgent, but the point of view in each is enough different to affect the result very materially, in a way. The newly established home is, of course, to be permanently planted, and this permanence will enter into the selection of the plants as well as into their arrangement, even in the first year. The primary consideration on such a place will, therefore, be the permanent effect—the ultimate result—while this year's bloom, however essential it is deemed to be, and however keenly it is desired, must be more or less incidental.

But the garden of "temporary residence" has no such foundation upon which it must—or may—be built, unless, indeed, it is the work of a rare type of gardener. Frankly, I have never been able to see any good reason for the general reluctance to plant permanent things in the garden of an impermanent home; and why we do not as willingly buy a dozen plants of chrysanthemums for fall bloom as we do a dozen of pansies for spring bloom, is not apparent, on the face of things. Perhaps it is that the pansies are



It is possible to make an immediate showing by purchasing plants from a local florist or nursery. Such things as these—English daisies, pansies, and spring-flowering bulbs—are easily obtainable

Wol

in blossom when the season of purchase is at hand, and beguile us with their charming little faces, while the chrysanthemums are so unassuming and promise so little at that time, that they are passed unnoticed. It is likely, too, that more permanent flowers would be used if more were offered by florists and marketmen. It is a demand that would be created by exhibiting the supply; but they are not so offered, for commercial reasons. There is not so much money, because there is a little more trouble, in raising the perennials.

Circumstances and personal taste must govern in a this-year garden, it is evident, just as they do in every sort of garden; and it is a matter for individual decision and selection. There are places and times where annuals alone are advisable, unquestionably; but there are other places, perhaps of temporary residence only, where certain permanent plants may just as well be used. And though we are none of us willing to plant for the benefit of subsequent tenants at the sacrifice of ourselves, surely there is no reason why we should not be willing to let subsequent tenants benefit, if it happens that

6 *Making a Garden to Bloom This Year*

they do. So, use the permanent things wherever they may go, regardless of the temporary nature of the home; and take a clump of the roots of each to the next abiding-place and establish them there. For the roots of perennials not only may, but should, be divided at intervals, to keep the plants at their best. So none ever need be lost to the original owner, even though others do enjoy their offspring.

The care bestowed upon the soil is, perhaps, the one greatest factor in producing results this year. A plant that is given exactly what it likes the best, in the form most easily taken up by it, will naturally flourish—and a flourishing plant is generous. It is not, however, altogether a matter of enriching the soil, although all quick-growing plants like rich earth, but it is a matter of giving to each variety its peculiar requirements—if it has peculiar requirements. In many instances these are not fixed—they may vary with a season, or with a locality—but, as a general thing, good garden soil will accommodate the average plant, providing it is well prepared, and well cared for. Nothing can do its best when neglected.

The earth in the garden should always be fine—as fine and mellow as it can be made—with plenty of manure, broken into very small particles, mixed through it by turning both over together, again and again, with a spading-fork. If it is at all stiff, which will make it inclined to cake on top after a rain, mix an extra quantity of the manure into the upper inch of it, to overcome this tendency; and add sand also, if it is available. And then let nothing rob the beds and borders of the attention they require twice a week at least, all summer, and always the day after every rain—that is, the gentle surface tilling that keeps a loose, light blanket of dry earth—dust—on top of the ground, to hold the moisture in the depths, where the plant roots have gone in search of it.

Whatever the plants to be used, whether annual or perennial, this same thorough preparation of the soil is necessary; and slighting it at all will diminish the garden's chances of success in just a proportionate degree. In gardening it is especially true that well begun is half done, but do not forget that there is another half.

COLOR AND ITS COMBINATIONS

THERE is no tabulation which can give all that there is to be given—or learned—about color. Perhaps it is not to be “given” under any circumstances, for eyes see so differently, and people feel so differently. Yet that there should be some standard there can be no question, for the most riotously flowery garden has very little real beauty if its colors are inharmonious and badly selected.

Flowers, of course, select for themselves, and sometimes they disarrange all of the carefulest color schemes in the world by dressing themselves up unexpectedly. Perhaps the fashions change in flower-land as unceremoniously as they do with us; not all follow them, to be sure, but there are some that may: you never can tell. Certain flowers, however, keep within certain lines—and this makes it possible for us to govern things, within a reasonable limit. The thing that is likely to be forgotten, it seems to me, is that color in the garden is

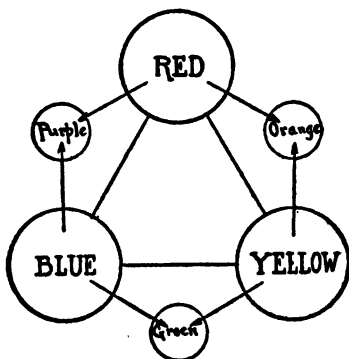
just the same as color anywhere else; and that it should, therefore, be handled just as carefully there as it would be in a room or on a dress. The fact that it is out-of-doors and thrown down in big splashes, with a sublime faith in luck to straighten out the discords, will not reconcile scarlet to maroon. Their bad language to each other will be quite as shocking to refined senses, and a great many more people will have to suffer from it than would be obliged to if it all happened in a less conspicuous place.

Even maroons and scarlets, however, may be made to dwell in peace and content, and at no great distance apart, either, if the right influence is brought to bear on each. It is a matter of "attuning." (Curious, by the way, how impossible it is not to speak of music and color in the same terms.) There is a simple way of determining color relations which, if followed, will not only insure the garden against unhappy combinations, but will secure for it unusual color harmonies. A little diagram will help in making it clear.

That there are three primary or fundamental colors, we all know—red, yellow,

10 *Making a Garden to Bloom This Year*

and blue. That the three secondary colors are composed each of a union of two primary colors, is, perhaps, less well known. The diagram shows this, and shows how it is so, and which combination makes which. The three larger rings rep-



resent the three primary colors—red, blue, and yellow. The three smaller rings represent the three secondary colors—purple, orange, and green. Each of these secondary rings is opposite or directly across from the primary which is its complementary color—that is, the primary which it does *not* contain: and it is con-

nected with the two primaries which together compose it.

The law of relations—if it may be called by so profound a name—is in two parts. The first is this: each primary color may be carried to the next primary color by way of the secondary color which the two compose. For instance, if a mass of yellow flowers are to be used near a mass of red—the shade of clear red which contains no yellow—something orange will make a transition from one to the other, that will relieve the eye by allowing both the yellow and the red to retain their full brightness, and yet not clash. Similarly, if strong blue is to come near to strong red, blue-purples next the blue leading to red-purples next the red, will blend one into the other, and leave no sense of violence such as would be felt if the two came close together in their purity. And maroons and scarlets—the two most notorious color belligerents—are harmonized in exactly the same way, by a gradation of shades which shall lead from maroon through pure red on across to scarlet.

The second part of the law is this: complementary colors may be used together

12 *Making a Garden to Bloom This Year*

only when one is shown in much greater proportion than the other. Red, which is the complementary to green, is delightful with it in the proportion which Nature gives us when she covers a plant with blossoms or fruit, burying the green of its foliage beneath the mass, so that only a small part of it shows. Note, by the way, that only a small part of a plant's foliage ever does show, for the mass is broken by the shadows lying among the leaves and the high lights which they reflect. The opposite proportion, seen in the red of holly berries against the glossy leaves, is lovely, too. But red and green together in anything like equal amounts are nerve-raspers.

Many blue flowers have orange centers, but it is only a touch at the center—very little in comparison with the amount of blue displayed. Likewise there are yellow and purple combinations of the most ravishing loveliness, but always the yellow is in the ascendant or the purple; they are never equally displayed. Iris is an example of this; so are pansies. These two colors, however, clash less than either of the other possible combinations, probably



One of the most satisfactory annuals is the old-fashioned "Mourning Bride" or Scabiosa. Perhaps the best color is the extremely dark shade—almost black

100

100

because yellow in its purity is a color of such wonderful light and transparency. Pure yellow, indeed, is very rare in nature, for yellow flowers are usually shaded towards red or blue—that is, into orange or green.

All of this is general, of course, and elastic in its application, for among flowers the green of the foliage and the white which we may always fall back upon, allow a really wide latitude. It is well, however, to conform to these basic principles, unless one is a color genius. Then very wonderful color harmonies—truly “lyric” gardens—may be worked out, by making daring departures from them. Whistler did this in some of his pictures—but Whistler is caviare to the masses, remember: and it is the masses usually for whom gardens are planted and tended. We are most of us the masses; very few have a color perception of such delicacy that the commonly accepted discords are actually seen to be harmonies.

CULTURE

S OIL in which seeds are to be sown cannot be too fine and delicate in texture, and, all things considered, I have made up my mind that more seeds fail because of unsuitable soil than from any other cause. It makes no difference how sturdy a plant may be going to become when it grows up, it starts as a tender, wee infant; and its puny strength must not only rend the imprisoning earth above it, but it must put forth the arms with which this is to be done. The less vitality that need be used, therefore, in breaking through, the more there is to use in growing—hence the greater vigor, the more luxuriant growth, the greater strength.

Very rarely is even a good garden soil quite the ideal soil for starting seeds in boxes, for it is not mellow enough. Rotted sod is the skilled gardener's hobby—sod taken from rich old roadsides, where grass grows thick and soft—but this is not to be had for a this-year garden. So the next

best thing, which is the scrapings from the under part of good rank sod, must be taken. Scrape them with a rather sharp metal edge, thus breaking all the root particles in them up into a fine mass. Screen one part of this soil to one part of dry leaf-mold from the woods, or two parts of the soil to one part of thoroughly rotted, fine manure, through a quarter-inch mesh sieve. I find a wire basket, such as the household departments sell for lowering eggs or potatoes into a kettle to boil, just the thing. Then add sand enough to the mixture to make it crumble apart readily, even when moistened. Usually one-third sand is about right.

This work of preparing soil will doubtless seem a fearful task, and I am sure no one ever did it without getting very tired of the job; but not a great amount needs to be prepared, for flats are very shallow, and three inches of earth is the most ever needed. Some, indeed, use but two. And getting the earth ready is the one thing that cannot be slighted without jeopardizing all the subsequent work undertaken, through the plants being weaklings and poor specimens at the start. I find this

16 *Making a Garden to Bloom This Year*

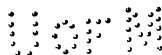
thought very stimulating when my spirit lags. Do it all well: give up a forenoon to it—more if need be—and secure a soil that is even, fine, soft, and mellow, before you open a seed packet.

Flats made from cracker boxes are just right in size and weight, and two boxes will make several. Cut one into three-inch sections lengthwise: the top section, with the cover nailed on it, is already one flat, the bottom section another. Onto one side of the other sections nail bottoms made from the other box; bore half a dozen holes in the bottom of each of them for drainage—and they are ready.

Cover the bottom an inch deep with, first, a layer of cinders or gravel—anything that will be loose and stay so; then put screenings over this. On top of this drainage layer spread the prepared soil and jounce the flat onto the table to settle it all well. Sow the seeds according to the directions which each packet bears, covering them usually to the depth of their own diameter. Some give them twice this cover, but a little is better than too much. Sift the earth onto them and pat it down gently with a float or flat board, or the



It is a simple matter to make flats from cracker boxes by cutting these into sections three inches deep. A sieve for securing fine soil and a watering can with a fine-spray nozzle will be practically all that is required



1100

hand, held very flat. The float is better, because it leaves no little furrows into which even a little water can wash the seeds.

Soil that has been well watered the day before planting is in just the right state of moisture to receive seed and to be sprinkled over them. Water the flats after seeding, either with a fine sprayer that will spread the moisture in a mist, or else through two or three thicknesses of coarse cloth, like burlap, with a watering-pot. This is to prevent the force of the water from washing the seeds out and messing things up generally, as it most certainly will if poured from the pot directly upon the soil.

Put the flats in a warm place—a sunny window will do if direct sun is kept from the earth surface by means of a semi-transparent curtain; and keep them evenly moist—*not* wet—until the seedlings are above the surface. After they appear keep very careful watch upon their moisture supply and water them whenever the soil is *dry*, *before* they have had a chance to wilt. Give as much water at such times as the soil will take up—then

18 *Making a Garden to Bloom This Year*

do not water again until it once more looks dry. And be very careful to keep the little plants themselves dry—their stems and leaves.

Transplant them to flats an inch deeper than the original seed flats—or flats having an inch more earth in them—or to pots (the little paper pots are a great convenience, especially when setting out finally), when the second true leaf appears, unless the directions on the packet stipulate differently. Water the soil—this must be similarly prepared—into which they are to go, the day before transplanting, and, likewise, water that in which they already are. Then they will loosen readily from it. Take them up by shoving a knife or trowel down at the edge of the flat and loosening a chunk of earth, plants and all. Then crumble this gently apart in the fingers, detaching the little roots carefully. They will come out quite easily this way, with seldom a fracture of even the most delicate.

Set each little plant into its new quarters with the aid of a dibble—a round, tapering-pointed affair made from eight inches of old broom-handle, sharpened to

a slim point—the slimmer it is the better, for tiny seedlings. Or something much smaller may be used—any stick whittled down to this form; the large form is necessary for heavy work, but a match will serve for this kind. Thrust it down into the earth to make the hole to receive the plant, and make this as deep as the length of the roots, plus half the stem. Lower the little plant into it until only half the length of its stem remains above ground: then press the dibble into the soil again, an inch from the first hole, and crowd the earth over and against the roots by tilting the top of it. Firm it finally by pressing lightly down on each side of the stem with the balls of the thumbs, but do not pack it as tightly as you feel that you can. The idea is to get all the little root hairs in contact with earth, and to do this without dragging against them from any direction; and this final pressure down is only to close up all gaps in the earth that may be anywhere about the plant, not to push it down into the earth.

Water thoroughly after transplanting—the soil, not the tops of the plants—and then give the seedlings all the fresh

20 *Making a Garden to Bloom This Year*

air possible, without chilling them, *all* the time. Remember it is the breath of life to them as well as to us. Water them whenever the soil looks light-colored and dry on top—not oftener—and shade from the noonday sun for a day or two after transplanting.

Prepare the soil outdoors just as carefully, as far as your preparations go, as you have that for the seeds. This has already been spoken of. Take the little plants up just as carefully when it comes to setting them into permanent quarters, even though they are very much bigger and sturdier, as you did when moving them the first time, if they are in flats. If they are in the paper pots it is simply a matter of stripping off the pot and setting them into a hole exactly the size of the earth ball. Be sure that this hole has no pocket at the bottom of it, however—that is, a place down in the middle that is a little deeper, and that remains void of earth when the plant is settled into place. Such pockets are very disastrous—and very easy to leave, unless one is on the lookout for them.

Keep the soil on top loose, *always*: if this



After the soil is made fine it should be brought to a level surface and firmed with a board or block



Until the seedlings appear the flat may be covered with glass to conserve moisture. As soon as the seedlings are above ground, however, they need ventilation

Wno

is done as it should be, there is no necessity for saying keep out weeds, for weeds cannot get in. When flowering-time is reached, keep all dead flowers cut away promptly, and do not let anything go to seed. This induces more flowers.

The most troublesome insects are aphids which suck the plant juices, and beetles which devour the plant substance. For the former a spray of strong ivory or common laundry soapsuds, made in the proportion of one-fourth a cake to four gallons of water, and used hot, will usually prove very effective; but devouring insects mind it no more than a summer rain. Direct poison must be fed to them, or they must be picked off by hand or knocked into a dish of kerosene-flavored water. The safest direct poison is hellebore, this being non-poisonous to man. It is non-poisonous to some bugs also, unhappily, though this is not generally the case. Use the powder just after a rain or in the morning before the dew is off—or sprinkle the plants affected and use it while they are wet. This so that it will stick to the foliage: do not do it while the sun is full upon them.

PART TWO—THE KINDS OF PLANTS

ANNUALS

WHILE it is customary to say that spring bloom cannot be secured with annuals, it is possible to have a few in bloom, or very near it, indoors, ready to plant out the first day that conditions permit. And although this does not provide the garden with flowers as early as flowers may be had when hardy bulbs and shrubs are established in it, it nevertheless makes a very good beginning; and from this beginning on to the summer's end, there need never be a day without quantities of flowers.

This continuous bloom may be secured in two ways. One, which we may call the natural way, brings it about by the selection of those varieties which naturally succeed each other in development and period of bloom. The other—the artificial way—is by means of groups of successively maturing plants of anything preferred,

obtained by successive sowings of the seed, each set being ready to bloom just before its predecessor leaves off. The latter is a little more troublesome possibly, in that it involves sowing and transplanting operations all summer, but it is certain. Whereas the natural way is likely to leave gaps, no matter how carefully it is planned, for conditions do not always favor the young plants sufficiently for them to keep to their schedule, and some may lag while others may hurry. Then it is not possible to find many annuals with which to carry through a natural succession, for the most of them mature in about the same length of time—naturally—so, instead of coming into blossom successively, they all come into blossom nearly at once. The natural method is, therefore, somewhat limited as to species, and although this is not so great a disadvantage as it may at first glance seem, it becomes a very decided drawback if any one "crop" fails. But it is all a matter of personal choice, in the end, just as it should be; each gardener must decide for himself which method he will take.

Every individual has, consciously or unconsciously, a garden ideal. Find out

24 *Making a Garden to Bloom This Year*

what yours is, first of all. What do you want? Brilliance and show? Or fragrance? Or perfection of specimens? Or size and number of flowers? Or a general effect? Or a color scheme? What have you in mind—what visualizes before your inner eye when you think about and anticipate your garden? When you have answered yourself this question, select accordingly. Perhaps the study of just one species may seem more worth while than anything else. Asters, for example, in all their varieties, are so beautiful and so varied that there will be no monotony in a garden which grows just them alone: the annual phlox, ranging through a great number of colors, possesses great variety; or a garden devoted to the multitude of exquisite poppies which the market affords will be a wonderful place. Select every variety of the flower chosen, if you elect a specialty garden of this sort, or, at least, all of the choicest varieties.

But it is absolutely necessary to have more than one species if early bloom is desired, for the annuals which will afford anything like spring blossoms are

not quite varied enough to warrant making a garden of them alone; while the splendid species which are available for this specialty scheme require until late June at least to reach the flowering stage.

Early bloom from annuals is something of a poser, for there are few plants, indeed, which can be expected to produce flowers in less than eight weeks from the time of sowing. A few prodigies may do it in six—but it is likely to be a longer rather than a shorter period. Indoor sowing of annuals, therefore, made in March may not usually be expected to produce flowers before May—and May is as early as it is generally safe to set the plants outside anyway, in the latitude of New York. Pansies, which may be started earlier, are hardy enough to endure April's uncertainties, but pansies are not annuals, although they usually are treated as such owing to their blooming better when newly raised from seed each year. The very early spring plants of pansies that are offered by florists are usually seedlings of the previous August sowing, wintered in a coldframe. Aside from pansies, there is practically nothing

26 *Making a Garden to Bloom This Year*

that can be trusted to the garden before the first of May; count back eight weeks, and it gives March first as the proper time for planting the seed indoors—for the things which only require eight weeks to mature. Start the slower things earlier.

There are, roughly speaking, at least seventy annuals that are worth growing—that is, *well* worth growing—in a garden; which is fully three times as many as any one garden should contain, and six times as many as the majority of gardens can accommodate with good effect. From ten to twenty kinds are enough anywhere, for it is always the rule that many of a single kind—great broad masses where there is space—are to be used instead of small clumps or single plants of many kinds. And, with most of them, separate colors will produce a much better effect than mixtures, though I should not advise this as a rule to be slavishly followed. It depends upon the plant and the kind of blossom it produces, of course.

Masses of blue, of pink, of scarlet, of any color which is fancied, should always prevail over color mixtures, but a few “rainbow” groups, or scatterings of vari-

colored flowers through the garden, will do no harm. Snapdragons, balsams, carnations, and cosmos are all pleasing in combinations or mixed colors, but phlox is much more effective in separate color masses or in shadings from dark to light, and on to white; sweet peas, almost universally planted in mixture, are much lovelier massed in a single color, and the annual larkspurs, though pleasing in mixtures, are far more impressive when kept separate. Shades ranging from the lightest tone to the darkest of one color, such as these show in blue or pink, make lovely groups.

Use plenty of white flowers always, not only between the color groups, but scattered into them here and there—just at their edges. Flower groups in a mixed border should always show this irregularity where they come in contact, intermingling to a certain extent and never stopping with a definite line. Only in somewhat formal arrangements should plants ever conform to sharp and clearly drawn lines. Do not depend altogether on the presence of white between two inharmonious colors, however, to make the effect

28 *Making a Garden to Bloom This Year*

pleasing. Sometimes it is necessary to do more than plant something between such colors, as the chapter on color has intimated. Maroons and scarlets, to go back to the two greatest offenders, are much more pleasingly reconciled by the introduction of the graded tones, as suggested, than they could be by having something white set in between them. Indeed, this will not reconcile them at all—it will only separate them. And unless it separates them very far apart indeed, they will still carry on their warfare.

It is not alone for purity of color that the separate seed packets are advised, but for choice of stock as well. The better varieties are usually grown in separate colors and furnished thus by the dealers; hence there are two reasons for getting them in this way—and even where a mixture is desired, it is best to buy the separate color packets and mix either the seed from these before they are put into the ground, or the plants as they are set out. Then, too, in even the choicest “mixed packet” one color will almost certainly predominate, through its running stronger, perhaps, or through the mixture’s not be-

ing carefully put up; so such packets are not very satisfactory, under any circumstances.

Annuals should be grouped quite as carefully, and with as much regard for their form and color as perennials receive. Only by thus handling them can a definite "garden" be achieved; and by thus handling them the effect of a long established, permanent garden may be realized by mid-summer. Think of them collectively as garden material; do not stop with the brilliant vision of salvia around the house—and all over the place, as some use it—or of sweet peas climbing the porch railings. These are not a garden—indeed, they are a movement away from a true garden, rather than towards it, for a real garden is not all taken in at one glance—and it has more to recommend it than flaming color on a hot August day. Even this year's garden may have a vine-covered bit of shade, ready by the time summer heat has grown most oppressive, to shelter those who wish to haunt it.

Generally speaking, most annuals will grow in almost any soil—if anything at all will grow in it—and there are a few

30 *Making a Garden to Bloom This Year*

available for special places. So it is safe to say that no location need be without flowers altogether, however unfavorable its conditions may seem. And even the unenclosed dooryard, lying open to the street, may be given a certain amount of distinction by being "hedged" with castor beans, reinforced with the giant spider flower; or sunflowers, tall-growing grasses, and dainty summer cypress. Indeed, quite an impenetrable thicket may be set up, with the rank growers for a backing, and lower-growing things in front to fill the gaps; and the summer cypress lends itself to the edging of walks or inclosing beds or borders in a very charming fashion, quite suggestive of permanent green edgings.

Right here, however, let me say that it is never necessary nor desirable to imitate with annuals the effects of permanent plantings; this is very far from being the suggestion which I would convey in mentioning this use of summer cypress. But a plant whose habit is such that it is distinctly valuable in certain positions, should occupy those positions regardless of whether it is an annual or a perennial.



Summer Cypress (*Kochia trichophylla*), with its symmetrical habit of growth, is particularly valuable to the eleventh-hour gardener

3 3 3 3 3 3 3 3 3 3
3 3 3 3 3 3 3 3 3 3
3 3 3 3 3 3 3 3 3 3
3 3 3 3 3 3 3 3 3 3

State is the condition

Summer cypress (*Kochia trichophylla*) is a perfectly symmetrical, formal, egg-shaped little pyramid: for this reason it is adapted to exactly the same positions that any pyramidal, formal plant may occupy. Being of symmetrical shape, it naturally forms an ideal low hedge, border, or edging, when the plants are set shoulder to shoulder—so it may, with perfect propriety, be used in this way, and still not be used “in imitation” of something else.

I make this somewhat elaborate explanation because I do not wish to be understood as ever advocating the use of one thing to imitate another. That is unnecessary, to say nothing of its being the extreme of bad taste. A garden of annuals should not be planted with the idea of imitating a garden of perennials—they are two distinct kinds of flower garden—but the same rules govern the grouping of flowers, whatever they may be; and the result of conforming to these rules will be good in either case, without either being an imitation of the other.

If your garden is to follow a conventional design, uniform edgings to the bor-

32 *Making a Garden to Bloom This Year*

ders or beds will add greatly to the effect of the whole. The most pleasing arrangement is, first of all, an eight-inch band of turf, next to all walks; then next to this a row of white alyssum the same width—a single row of plants will make it—or of ageratum, if a blue flower is preferred. Use catchfly (*Silene pendula compacta*) for pink or rose, or there are rose-colored ageratums to choose from. *Sanvitalia procumbens*, fl. pl., will furnish a yellow border, but a very little yellow goes so far, and is so aggressive, that it is not a particularly desirable color to use for an edging.

Irregular and informal borders should, on the contrary, never be outlined, for such outline robs them of all their individuality and character. The easy flowing foreground line of an informal border is completely out of harmony with any attempt at sharp demarcation, for the basis of such a border is Nature's own method of planting. And Nature knows no hard and fast lines of separation; everything blends into everything else, and natural growth wanders where it listeth. For the same reason lawn should run up

to, and fairly under, the plants at the front of the informal border, appearing to discontinue simply because the plants are there, and it can go no further. Even though it is close-clipped and well-groomed lawn, the lines must follow the lines which are carelessly and gracefully "natural"—and the scheme of the planting must also follow Nature's careless grace. Here a little, there much, and all free and happily indifferent to restraint—seemingly. That is the rule.

COMPARATIVE LIST OF ANNUALS

(Trailing and up to Six Inches in Height)

Ageratum—Floss Flower; light and dark blue, also rose; start indoors; set out May 1.

Alyssum—Mad-wort; all varieties white; start indoors or early outside.

Ionopsidium acaule—Diamond Flower; violet; sow out in May; cool moisture.

Lobelia compacta—Lobelia; white, blues, maroon; start indoors; set out May 1.

Phlox Drummondii, nana compacta—white, pink, scarlet; start indoors or out.

34 *Making a Garden to Bloom This Year*

Portulaca—Sun Plant; various; likes poor soil; sow late May, outside.

Sanvitalia procumbens, fl. pl.—Bright yellow, double flowers; start indoors or out.

Silene pendula compacta—Catch-fly; white, pink, red; sow fortnightly, April 1 to July.

(Six Inches to Fifteen Inches)

Adonis aestivalis—Pheasant's eye; crimson; sow in March; set out May 1.

Ageratum—Imperial varieties; white, blue; start indoors; set out May 1.

Asters—Dwarf and Waldersee varieties; various; lime the soil in beds; sow in March-April; set out May.

Calendula—Marigolds; white, yellows, reds, browns; start early indoors, or outside.

Phlox Drummondii, grandiflora—White, pink, lilac, red, yellow; start indoors or out.

Calliopsis—Calliopsis; yellow, crimson, red-brown, brown; start outside; thin out.

Candytuft—Candytuft; white, rose, lavender; sow fortnightly, April 1 to July 1.

Dianthus — Annual pinks; various; start indoors; set out May 1.

Eschscholtzia Californica—California Poppy; white, orange, rose, scarlet; sow only in the ground.

Gomphrena—Globe Amaranth; red, yellow; "everlastings"; start indoors or out.

Gypsophila — Baby's Breath; white, pink; sow fortnightly, April 1 to July 1.

Linum coccineum — Scarlet Flax; scarlet; start indoors; set out May 1.

Pansies; various, start indoors March.

Schizanthus—Butterfly Flower; various; sow from April 1, fortnightly.

Schizopetalon Walkeri—Maze Flower; white; sow outdoors in permanent location.

(Fifteen Inches to Twenty-four Inches)

Acroclinum—Everlastings; white, pink; single and double; sow indoors or out.

Antirrhinum—Snapdragons; white, yellow, pink, scarlet, etc.; start indoors in April.

Asters—Giant Comet type; peony-flowered type; tassel or Japanese aster.

Calliopsis coronata—Calliopsis; pure

36 *Making a Garden to Bloom This Year*

yellow; sow in permanent location; thin out.

Carnations—Marguerite type; white, yellow, rose, crimson; start indoors in April.

Centaurea imperialis—Sweet Sultans; white, rose, purple; start seed indoors in April.

Gaillardia—Blanket Flower; brilliant crimson, orange, etc.; sow where they are to bloom.

Matricaria Capensis—Feverfew; white; start indoors or out.

Nasturtiums—Bedding varieties; yellows, browns, scarlets, etc.; sow outdoors.

Petunia (save *weakest* seedlings)—white, pinks, reds, variegated; start indoors; set out May 1.

Saponaria vaccaria—Bouncing Bet; pink; start in April; set out in May.

Salpiglossis—Painted Tongue; white, rose, crimson, purple, gold; start in April; set out in May.

Vinca rosea—Periwinkle; white, rose, mixed; start indoors; set out in May.

Wallflower—Wallflower; yellows and yellow-reds; start in March; set out April 20.



Schizanthus, or, as it is commonly called, the Butterfly Flower, is one of the daintiest annuals of comparatively low growth

1901

(Twenty-four Inches to Thirty-six Inches
and up, As Noted)

Arctotis grandis — African Daisy;
white, lilac beneath, large; start indoors
in April.

Asters—Late, branching type; various;
start indoors in April.

Balsams—Lady Slipper; white, pink,
violet, etc.; start indoors in April.

Bartonia aurea — Golden Bartonia;
golden-yellow; sow in May in permanent
location.

Chrysanthemums—Garden type; white,
yellow, and various; start indoors in
April.

Cleome pungens—Spider Flower; rosy-
lilac; start indoors or out.

Cosmos (grows to seven feet)—White,
pinks, crimson; start indoors; set out
May 1.

Datura—Trumpet Flower; white, yellow;
start indoors; set out May 1.

Delphinium ajacis—Larkspur; white,
pink, blue, lilac, dark blue; start early indoors,
or out.

Mirabilis Jalapa—Four o'Clock; various;
sow where they are to bloom.

38 *Making a Garden to Bloom This Year*

Papaver—Annual Poppies; white and various; sow where they are to bloom, as they seldom survive transplanting.

Scabiosa — Mourning Bride; white, pink, red, lilac, purple; sow indoors or out.

Stocks — Cut-and-come-again; white, yellow, rose, blue, red, lilac; start in March; set out April 20.

Zinnias — Youth-and-old-age; white, pink, yellow, red, etc.; start in April; set out May 1.

ANNUALS FOR SHADY PLACES

(Under Twelve Inches)

Adonis aestivalis (already described).

Asperula azurea setosa—Sweet Woodruff; lavender-blue; start indoors or out.

Nemophila—Love Grove; various; start indoors in March; *must* have cool place and not rich soil.

(Twelve Inches to Twenty-Four Inches)

Fuchsia—Fuchsia; coral; well known; start indoors; also house plant.

(Twenty-four Inches up)

Clarkia—Clarkia; white, salmon pink; start indoors or out.

Lupinus—Lupines; various; start indoors or out.

ANNUALS FOR SANDY OR POOR SOIL

(Under Twelve Inches)

Abronia umbellata—Sand Verbena; rosy lilac; start indoors or out; trailing.

Mesembryanthemum—Ice Plant; various; start indoors or out; dry soil.

Portulaca—Sun Plant; various; sow outdoors, late May.

(Twelve Inches to Twenty-four Inches)

Antirrhinum (already described) will grow in a light soil, but do not necessarily prefer it.

Godetia—Godetia; white, red, pink; start indoors or out.

(Twenty-four Inches up)

Amaranthus—Love-lies-bleeding; red; start indoors; set out in May.

40 *Making a Garden to Bloom This Year*

Celosia cristata—Cockscomb; crimson or variegated; start indoors or out.

(ANNUALS FOR BOUNDARIES)

Cleome pungens, gigantea — Giant Spider Flower; rose, lilac; forty inches high; start indoors.

Mirabilis Jalapa (already described).

FOLIAGE PLANTS

Kochia tricophylla—Summer Cypress; green to scarlet; thirty-six inches high; sow outdoors.

Pennisetum longistylum — Fountain Grass; greenish-white; twenty-four inches high; sow outdoors.

Pennisetum Rueppelianum—Green, purple plumes; thirty-six inches high; sow outdoors.

Ricinus Borboniensis—Castor Bean; green foliage; fifteen feet high.

Ricinus Philippiensis — Very large leaves; ten feet high.

Ricinus sanguineus—Red stalks and fruit; eight feet high.

Ricinus Cambodgiensis—Black stems; foliage changing; five feet high.

Ricinus Gibsoni—Deep red foliage; five feet high.

ANNUAL OR FIRST-YEAR VINES

Adlumia cirrhosa—Climbing Fumitory; pink; July; for trellises, trees, etc.

Bryonopsis laciniosa—Small Gourd; fruit ornamental; for trellises or arbors.

Cardiospermum Halicacabum—Balloon Vine; inconspicuous flowers; trellises or arbors.

Cobæa scandens — Cups-and-saucers; purple; July; start indoors in April.

Convolvulus major — Morning-glory; various; July on; arbors, etc.

Dolichos Japonica—Hyacinth Bean; white, purple; July; trellises, etc.

Echinocystis lobata—Wild Cucumber; white; July; arbors, trellises, etc.

Humulus Japonica—Japanese Hop; inconspicuous; screens, trellises, arbors, etc.

Sweet Peas—Get orchid type; various; plant in trench and “hill up.”

PERENNIALS

ALL that has been said of a general nature about annuals applies to perennials. The same necessity for adopting a definite ideal exists; groups are formed along similar lines; and special conditions require special treatment. For a garden of perennials which will bloom this year, there are very definite limitations, however; and the matter of design must be handled rather differently when dealing with this class of plants. Many perennials may suitably be planted among shrubbery—may take their place against the shrubbery border—which is not the right place for many annuals. And perennials, once planted, are there to stay—which makes it highly desirable to place them to their very best advantage in the beginning. Generally speaking, they lend themselves to broader effects than annuals, and of course they take pretty nearly all the care of themselves, once they are well settled where they are to stay.

A proper selection will insure bloom all summer long, but only the midsummer and autumn-blooming species come within our scope in the present instance, for these late-flowering kinds are the only ones that can be expected to flower the first year from seed. And many of even the late-autumn bloomers cannot be induced to blossom until the second year—but those I have not mentioned at all. There are less than twenty that are to be depended upon to give flowers the first year; and not all of these are *hardy* perennials—that is, they are not the kind that may stay out all winter without protection. Some, indeed, may not stay out at all, but have to be dug up by the roots and wintered inside, in a cellar. But with twenty species—or even many less—there is still ample material for a garden; so the number is not discouragingly low, by any means.

With every one of these let me emphasize the fact that they must be started early indoors, or in the hotbed—the earlier the better. None will blossom this year which are not given an early start—at least it is not possible to say that any certainly will. The middle of February is

44 *Making a Garden to Bloom This Year*

none too soon—later than the end of March is risky. As a matter of fact, the house offers an opportunity for earlier starting than the hotbed, ordinarily, for the latter is not ready usually before the first of March.

But there are the little plants themselves on sale in the spring—practically every kind of flower—and if these are resorted to, one may have anything, regardless of its being slow or fast growing. Some may not do as well the first year as later, to be sure, though, being pot-grown plants, they feel the transplanting so little that it sometimes does not affect them at all. It is usually only the early-flowering kinds—those whose natural period of bloom is earlier than July—which suffer much.

The tall, rich blue delphiniums at the back of a long straight border, with Japanese hybrid chrysanthemums against them, and *Gypsophila paniculata* in the foreground, is a suggestion that will fill a space four feet wide; or, starting at the back with *Hibiscus Manihot*, Shasta daisies may come next, *Dianthus barbatus* next, and an edging of *Cerastium tomentosum* mark the line at the grass. *Cam-*

panula Medium in blue, white, and pink varieties, and *Dianthus latifolius atrococcineus*, fl. pl. (scarlet double-flowered), are a possibility for a narrow border; Shasta daisy and *Gaillardia* is another; *Rudbeckia fulgida*, *Aquilegia Canadensis*, and *Polygonum compactum*, is a combination of yellows, orange-scarlets, and white for one a little wider.

Groups rather than rows, however, are a better arrangement for this class of plants—as has already been explained. But there are places where it seems to be necessary to put them in long borders, that are straight and severe, or else not to have them at all; it is for such places that these suggestions are made. The selections give color and height combinations that may be relied upon to be effective, but there are quantities of others, just as good—perhaps better. Each garden must find its own. Often plants have to be moved around a number of times before their one perfect location is found, amid the combination of neighbors which renders all most happy.

Be it noted that the only perennials treated or mentioned are those which,

46 *Making a Garden to Bloom This Year*

started early indoors, will bloom the first year. For this reason, many of the choicest are omitted, and the number which may be resorted to for special conditions is alarmingly small. In this connection it may be well to say that for rockeries it is better with some plants to start them only from seed, sprinkled into the pockets and ledges of rock wherein they are to grow permanently. Only by giving them, from the seed, the conditions which they desire, is it possible to succeed with them. The seed packets will have directions covering this, in every instance, however, if seed is purchased from only the best dealers.

COMPARATIVE LIST OF PERENNIALS

Only those which flower the first year from seed, started early indoors.

(Trailing and up to Six Inches)

Cerastium tomentosum—Snow-in-sum-
mer; white; white leaved.

Myosotis palustris — Forget-me-not;
blue; likes shady moisture.

Tunica saxifraga—Tunica; pink; small tufted plant.

(Six Inches to Fifteen Inches)

Dianthus latifolius — Sweet William hybrid; scarlet, rose, purple.

Polygonum compactum — Knotweed; white; fine for a rockery.

(Fifteen Inches to Twenty-four Inches)

Aquilegia Canadensis — Columbine; scarlet and yellow.

Coreopsis lanceolata grandiflora—Bright yellow.

Dianthus barbatus — Sweet William; various.

Gaillardia—Blanket Flower; red, gold.

Gypsophila paniculata—Baby's Breath; white.

Linum perenne—Hardy flax; blue.

Platycodon grandiflorum—Bell Flower; white, blue.

Shasta Daisy—A Burbank hybrid; white.

48 *Making a Garden to Bloom This Year*

(Twenty-four Inches to Thirty-six Inches
and up, As Noted)

Achillea ptarmica, fl. pl.—Yarrow;
white.

Campanula Medium—Canterbury Bells;
white, blue, pink.

Campanula Trachelium — Coventry
Bells; blue.

Chrysanthemum — Japanese hybrids;
white, yellow.

Delphinium, hybrids—Larkspur; blue;
grow to six feet in height.

Hibiscus Manihot—Sunset Mallow; yellow;
tender; take roots in; nine feet.

Lychnis chalcedonica—Rose Campion;
scarlet.

Rudbeckia fulgida — Cone Flower;
orange yellow.

Tritoma, hybrids — Red-hot Poker;
flame-scarlet.

VARIETIES FOR SHADY PLACES

(Under Twelve Inches)

Myosotis palustris (already described).

Mimulus tigrinus—Monkey Flower;
various; only half-hardy.

(Twelve Inches to Twenty-four Inches)

Aquilegia Canadensis (already described).

(Twenty-four Inches up)

Aquilegias in variety—Single-flowered forms.

VARIETIES FOR ROCKY OR POOR SOIL

(Under Twelve Inches)

Cerastium tomentosum (already described).

Oxalis—*Oxalis*; rose, yellow.

Tunica saxifraga (already described).

(Twelve Inches to Twenty-four Inches)

Polygonum compactum (already described).

Aquilegia Canadensis (already described).

50 *Making a Garden to Bloom This Year*

(Twenty-four Inches up)

Aquilegias in variety—Single-flowered forms.

PERENNIAL VINES FOR THIS YEAR

Pueraria Thunbergiana—Kudzu Vine; twining; arbors, etc.

Dioscorea Batatas—Cinnamon Vine; white; twining; arbors, trellises.

Apios tuberosa—Ground Nut; twining; arbors, etc.; plant two or three bulbs together.

Boussingaultia baselloides — Madeira Vine; twining; arbors, etc.; take roots up in winter and store in cellar.

SUMMER-FLOWERING BULBS AND ROOTS

GREENHOUSES and conservatories are the places for specimens that are rare and strange, not the garden. But there are certain bulbous tender things which are suitable for the garden, providing they are put in the right places and not given undue prominence. There is no class of plants that, for the labor involved, bring such rich returns of bloom, as bulbs; but for just this reason, perhaps, they are a much abused group, considered artistically.

The constant temptation with them is to sacrifice general effect for the individual. One goes quite mad over the beauties of gladioli, and loses sight of the fact that a garden planted with them becomes a nursery rather than a garden. They must have their proper setting, just as any other plant, if they are to become part of a garden, rather than the garden being a gladioli culture ground.

52 Making a Garden to Bloom This Year

Then there is the matter of beds, always to the fore when we consider bulbs. Beds of anything, except as they may be a part of some definite garden design, are hideous mistakes; and though all the be-guilements in the world, in the way of bedding plants, may be offered him, the true garden lover will repudiate them, and do his planting for what the dealers distinguish as "effects." Just where and how to plant bulbous plants, then, becomes a question—a poser, indeed. For we are so accustomed to them in beds that there seems no other place to put them.

There is no reason in the world for not putting summer bulbs against shrubbery in a shrubbery border, just as hardy bulbs—such as lilies—are so often, and with such delightful effect, planted. And, of course, dahlias may make a border by themselves almost as effective as shrubs. Indeed, where shrubbery is not established, they furnish an excellent summer substitute for it. Cannas, towering above so many of the garden's occupants, are well suited to light up the foliage of shrubbery groups; gladioli and tigridias, though not so tall, may occupy similar positions;

car
al-
bs.
a
re
e-
f-
re
o
r



Gladioli bulbs offer a convenient means of securing a wealth of bloom in a short time. Plantings may be made every two weeks for a succession

U. S. G. O.

The diagrams illustrate the arrangement of particles in three states of matter:

- Solid:** Particles are closely packed in a regular, repeating pattern.
- Liquid:** Particles are closely packed but arranged in a disordered, irregular pattern.
- Gas:** Particles are widely spaced and arranged in a disordered, irregular pattern.

Summer-Flowering Bulbs and Roots 53

while plants like the Peruvian daffodil and the Mexican Star-of-Bethlehem may go into a border in exactly the same way that our native daffodil or narcissus would. And the little zephyr flowers may be employed to make an excellent edging for just such a border.

It is with summer-flowering bulbs just as it is with every other kind of thing: they should be planted in masses to get the best, and the right, effect in a border—or else they should be planted in groups here and there in the midst of shrubbery. The thing to avoid is the appearance of artificiality, wherever they may be—and the bed, of whatever form or shape.

SUMMER-FLOWERING BULBS AND ROOTS

Agapanthus umbellatus — Blue Nile Lily; blue, white; plant out in June; grown in tubs or in border.

Amaryllis—*Amaryllis*; various; plant out in June; window plant usually; may go in garden.

Cannas—*Cannas*; various; set out late May; set one foot apart if in masses.

Dahlias—*Dahlias*; various; set out May